filed July 15, 1994, which is now abandoned, each of which are incorporated herein by reference in their entirety.

On page 11, please replace paragraph 3 with the following:

Figure 1A shows the results from a flow cytometry study using mouse B cells with the dihydrorhodamine 123 dye to determine levels of reactive oxygen species. The dye only sample in Panel A of the figure shows the background level of cells positive for the dye at 28.6%. This level of reactive oxygen species was greatly increased to 80% in the cells treated for 20 minutes with PMA and ionomycin, a positive control (Panel B). The cells treated with the CpG oligo (TCCATGACGTTCCTGACGTT SEQ ID NO: 10) also showed an increase in the level of reactive oxygen species such that more than 50% of the cells became positive (Panel D). However, cells treated with an oligonucleotide that lacked a CpG motif (TCCATGAGCTTCCTGAGTCT SEQ ID NO: 8) did not show this significant increase in the level of reactive oxygen species (Panel E).

On page 12, please replace paragraph 2 with the following:

Figure 11 is a bar graph plotting the effect on the percentage of macrophage, lymphocyte, neutrophil and eosinophil cells induced by exposure to saline alone; egg, then SEA; egg and SEQ ID NO: 10, then SEA; and egg and control oligo SEQ ID NO: 8, then SEA. When the mice are treated with the control oligo at the time of the initial exposure to the egg, there is little effect on the subsequent influx of eosinophils into the lungs after inhalation of SEA. Thus, when mice inhale the eggs on days 14 or 21, they develop an acute inflammatory response in the lungs. However, giving a CPG oligo along with the eggs at the time of initial antigen exposure on days 0 and 7 almost completely abolishes the increase in eosinophils when the mice inhale the egg antigen on day 14.

On page 22, please replace paragraph 5 of Table 1 with the following:

4	(SEQ ID NO:90)	TCAACGTT	6.1 ± 1.4	19.2 ± 5.2	
4a	(SEQ ID NO:91)	....GC..	1.1 ± 0.2		1.5 ± 1.1
4b	(SEQ ID NO:92)	...GCGC.	4.5.± 0.2		9.6 ± 3.4
4c	(SEQ ID NO:93)	...TCGA.	2.7.± 1.0	ND	

4d	(SEQ ID NO:94)	..TT..AA	1.3 ± 0.2	ND
4e	(Residue 2-8 of SEQ ID NO:90; SEQ ID NO: 106)	-.....	1.3 ± 0.2	1.1 ± 0.5
4f	(SEQ ID NO:95)	C.....	3.9 ± 1.4	ND
4g	(Residue 11-18 of SEQ ID NO:19; SEQ ID NO:107)	.....CT	1.4 ± 0.3	ND
4h	(SEQ ID NO:96)	C	1.3 ± 0.2	ND

On page 26, please replace Table 3 with the following:

Table 3. Induction of Murine IL-6 secretion by CpG motifs in bacterial DNA or oligonucleotides.

Treatment	IL-6 (pg/ml)
calf thymus DNA	<10
calf thymus DNA + DNase	<10
E. coli DNA	1169.5 ± 94.1
E. coli DNA + DNase	<10
CpG methylated *E. coli* DNA	<10
LPS	280.1 ± 17.1
Media (no DNA)	<10

5a	SEQ. ID. No:115	ATGGACTCTCCAGCGTTCTC	1096.4 ± 373.0
5b	SEQ. ID. No:19	.....AGG....A.....	1124.5 ± 126.2
5c	SEQ. ID. No:15	..C.....G.....	1783.0 ± 189.5
5d	SEQ. ID. No:[114]	124.AGG..C..T.....	<10
5e	SEQ. ID. No:116	..C.....G..Z.....	851.1 ± 114.4
5f	SEQ. ID. No:16	..Z.....ZG..Z.....	<10
5g	SEQ. ID. No:18	..C.....G.....Z..	1862.3 ± 87.26

On page 37, please replace paragraph 2 with the following:

Immune activation by CpG motifs may depend on bases flanking the CpG, and the number of spacing of the CpGs present within an ODN. Although a single CpG in an ideal base context can be a very strong and useful immune activator, superior effects can be seen with ODN containing several CpGs with the appropriate spacing and flanking bases. For activation of murine B cells, the optimal CpG motif is TGACGTT (SEQ. ID. NO: 108); residues 11-17 of Seq. ID. No 70.